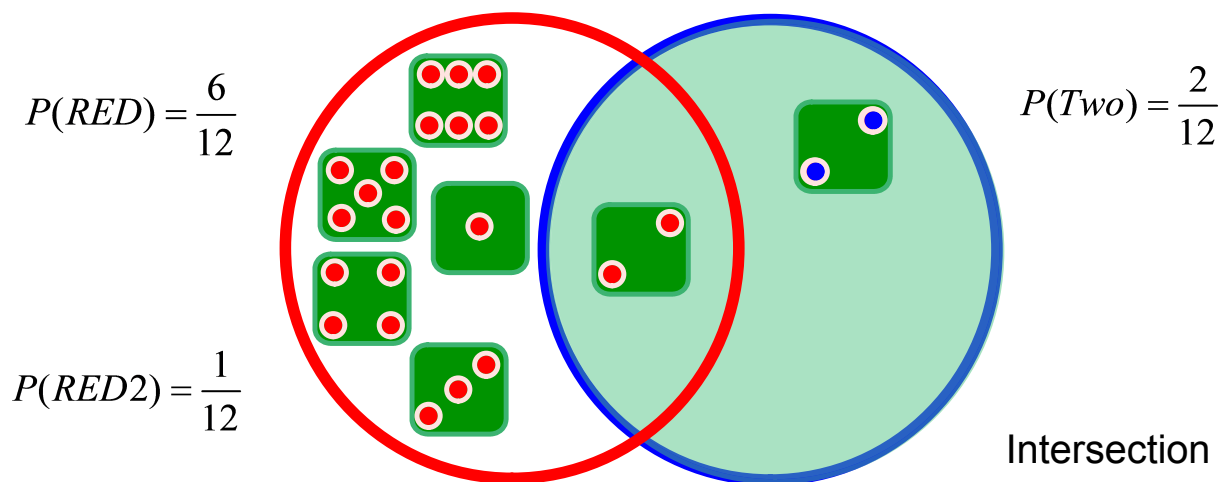


**Rolling two dice**

**OR**

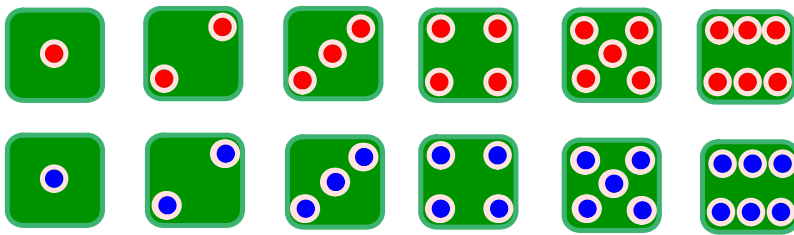
**& related**

What is the probability of rolling a red die or a two?



$$P(\text{Red}) + P(2) - P(\text{Red } 2) = P(\text{Red or } 2)$$

$$\frac{6}{12} + \frac{2}{12} - \frac{1}{12} = \frac{7}{12}$$



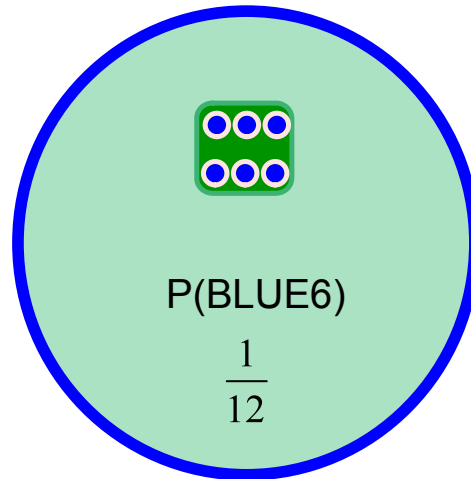
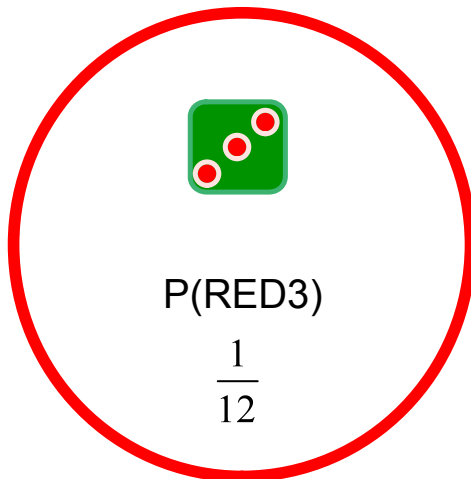
**Rolling two dice**

**OR**

& unrelated

What is the probability of rolling a red three or a blue 6?

Disjoint



$$P(\text{Red}3) + P(\text{Blue}6) = P(\text{Red}3 \text{ or } \text{Blue}6)$$